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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/711,129	08/26/2004	Terrance R. Kinney	A4-1811	5128
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HARTMAN & HARTMAN, P.C. 552 EAST 700 NORTH VALPARAISO, IN 46383				
EXAMINER				
PUNNOOSE, ROY M				
ART UNIT		PAPER NUMBER		
2886				
NOTIFICATION DATE		DELIVERY MODE		
05/09/2008		ELECTRONIC		

Please find below and/or attached an Office communication concerning this application or proceeding.

The time period for reply, if any, is set in the attached communication.

Notice of the Office communication was sent electronically on above-indicated "Notification Date" to the following e-mail address(es):

domenica@hartmaniplaw.com
gayle@hartmaniplaw.com

Office Action Summary

Application No.

10/711,129

Applicant(s)

KINNEY, TERRANCE R.

Examiner

Roy M. Punnoose

Art Unit

2886

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --
Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 24 January 2008.
2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-16 is/are pending in the application.
4a) Of the above claim(s) _____ is/are withdrawn from consideration.
5) ☐ Claim(s) _____ is/are allowed.
6) ☒ Claim(s) 1-16 is/are rejected.
7) ☐ Claim(s) _____ is/are objected to.
8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
10) ☒ The drawing(s) filed on 26 August 2004 is/are: a) ☒ accepted or b) ☐ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
a) ☐ All b) ☐ Some * c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. _____.
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- 1) ☒ Notice of References Cited (PTO-892)
2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
3) ☐ Information Disclosure Statement(s) (PTO/5508)
Paper No(s)/Mail Date _____
4) ☐ Interview Summary (PTO-413)
Paper No(s)/Mail Date _____
5) ☐ Notice of Informal Patent Application
6) ☐ Other: _____

DETAILED ACTION

Response to Amendment

1. Acknowledgement is made of applicant's amendment filed on 01/24/2008. The applicant has amended claims 1, 7, 10 and 15. Claims 17-20 have been cancelled previously. Claims 1-16 are currently pending in the application.
2. During a final search the Examiner has discovered prior art that is relevant to the applicants claimed invention, which is the subject of this office action. I view of the newly discovered prior art, allowability of claims stated in the previous office action has been withdrawn. Any inconvenience to the applicant is sincerely regretted.

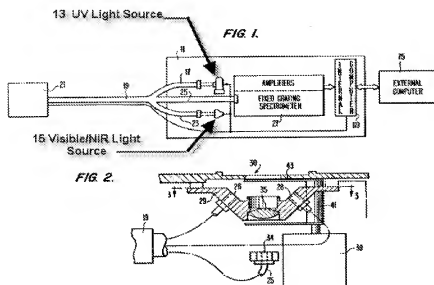
Claim Rejections - 35 USC § 102

3. **The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:**

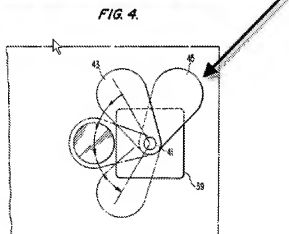
A person shall be entitled to a patent unless –

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

4. **Claims 1-3 are rejected under 35 U.S.C. 102(b) as being anticipated by Keane (US_5,040,889).**
5. Claim 1 is rejected because Keane teaches of a self-calibrating optical reflectance probe system comprising: an illuminant light source 13, 15 (see Figure 1) for illuminating a sample material; optical pickup means 57 (see col.4, lines 32-40) for collecting reflected light from the sample material; and an articulated white reference reflection standard 43 (see col.4, lines 29-31) adapted to generate a white reference signal for calibration of the optical reflectance probe system when articulated to a position for reflecting light from the illuminant light source 13, 15 to the optical pickup means 57 (see col.3, line30- col.4, line 52).



Articulated White Reference Reflection Standard



6. Claim 2 is rejected because Keane teaches of multiple illuminant sources 13, 15 (see Figure 1; col.3, lines 31-41).
7. Claim 3 is rejected because Keane teaches of multiple optical pickup fibers 28 (see Figures 2 and 3; col.3, lines 54-60).

Claim Rejections - 35 USC § 103

- 8. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:**

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

- 9. Claims 4-6 are rejected under 35 U.S.C. 103(a) as being unpatentable over Keane (US_5,040,889) in view of Gu et al (US_6,431,446 B1).**

10. Claim 4 is rejected for the same reasons of rejection of claim 1 above and because:

- A. Keane teaches all claim limitations except for an optical line source adapted for wavelength calibration and verification in a self-calibrating optical reflectance probe system.
- B. Gu et al (Gu hereinafter) teaches of an optical line source adapted for wavelength calibration (see col.7, lines 33-35) and verification in a self-calibrating (see col.8, lines 23-34; Figure 4A, 4B) optical reflectance probe system.
- C. In view of Gu's teachings, it would have been obvious to one of ordinary skill in the art at the time the invention was made to incorporate Gu's optical line source into Keane's system due to the fact that it would provide an additional source to make calibration more accurate so that any sample under test can be measured with more precision.

11. Claims 5 and 6 are rejected for the same reasons of rejection of claim 1 above and because in view of Keane's teaching of the use of one type of standard, a white standard in this instance, it would have been obvious to one of ordinary skill in the art at the time the invention was made to have or provide alternate standards such as spectral reference standard or a transmissive filter standard for dynamic range measurement and/or verification.

12. Claim 7 is rejected under 35 U.S.C. 103(a) as being unpatentable over Keane (US_5,040,889) in view of Arquilevich et al (US_6,655,778 B2).

13. Claim 7 is rejected for the same reasons of rejection of claim 1 above and because:

- A. Keane teaches all claim limitations except for a shutter adapted to generate a dark reference signal in a self-calibrating optical reflectance probe system.
- B. Arquilevich et al (Arquilevich hereinafter) teaches of a shutter 350 adapted to generate a dark reference signal (see col.16, lines 44-47; Figures 8 and 9) in a self-calibrating optical system.
- C. In view of Arquilevich's teachings, it would have been obvious to one of ordinary skill in the art at the time the invention was made to incorporate Arquilevich's shutter adapted to generate a dark reference signal into Keane's system due to the fact that it would provide a dark signal without the need for a dark/black reflectance standard (also called light trap in the industry) to make calibration more accurate so that any sample under test can be measured with more precision.

14. Claim 8 is rejected under 35 U.S.C. 103(a) as being unpatentable over Keane (US_5,040,889) in view of Alcock et al (US_5,974,210).

15. Claim 8 is rejected for the same reasons of rejection of claim 1 above and because:

- A. Keane teaches all claim limitations **except** for a viewport window comprising a curved surface to reduce reflected light from the window in an optical reflectance probe system for the illumination of a sample material and detection of reflected light.
- B. Alcock et al (Alcock hereinafter) teach of a viewport window comprising a curved surface 14 (see col.2, lines 44-61; col.3, lines 44-48); Figure 1) to reduce

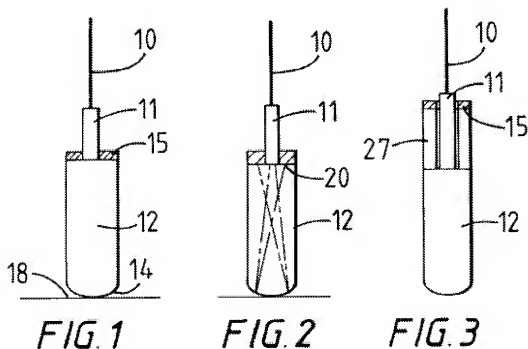
reflected light from the window in an optical reflectance probe system for the illumination of a sample material and detection of reflected light.

- C. In view of Alcock's teachings, it would have been obvious to one of ordinary skill in the art at the time the invention was made to incorporate Alcock's window with curved surface into Keane's system due to the fact that such a combination would reduce reflected light from the window in an optical reflectance probe system for the illumination of a sample material and detection of reflected light.

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5,974,210



16. Claim 9 is rejected under 35 U.S.C. 103(a) as being unpatentable over Keane (US_5,040,889) in view of what is well-known in the art.

17. Claim 9 is rejected for the same reasons of rejection of claim 1 above and because:

- A. Keane teaches all claim limitations **except** for a mount employing a sanitary pipe fitting and a clamp to secure a probe/optical measuring device at a desired location and to prevent any movement or vibration so that accurate measurements can be made with the optical reflectance probe system.
- B. It is well-known in the art to use various types mounts and/or fasteners to secure a probe/optical measuring device at a desired location and to prevent any movement or vibration so that accurate measurements can be made with the optical reflectance probe system.
- C. In view of what is well-known in the art, it would have been obvious to one of ordinary skill in the art at the time the invention was made to incorporate any desired type of mount and/or fasteners to secure a probe/optical measuring device at a desired location and to prevent any movement or vibration so that accurate measurements can be made with the optical reflectance probe system.

18. Claims 10-16 rejected for the same reasons of rejection of claims 1-9 above and because claims 10-16 are similar to or comprise various combinations of limitations found in claims 1-9. For example, claim 10 is a combination of claims 1, 4 and 8. Claims 11, 12, 13, 14, 15 and 16 are similar to claims 2, 3, 5, 6, 7 and 9 respectively.

Summary/Conclusion

- 19. Claims 1-3 have been rejected under 35 U.S.C. 102(b).
- 20. Claims 4-16 have been rejected under 35 U.S.C. 103(a).

The prior art cited in the accompanying PTO-892 is made of record and not relied upon, is considered pertinent to applicant's disclosure.

Contact/Status Information

21. Several facts have been relied upon from the personal knowledge of the examiner about which the examiner took Official Notice in this office action. Applicant must seasonably challenge well known statements and statements based on personal knowledge when they are made. In re Selmi, 156 F.2d 96, 70 USPQ 197 (CCPA 1946); In re Fischer, 125 F.2d 725, 52 USPQ 473 (CCPA 1942). See also In re Boon, 439 F.2d 724, 169 USPQ 231 (CCPA 1971) (a challenge to the taking of judicial notice must contain adequate information or argument to create on its face a reasonable doubt regarding the circumstances justifying the judicial notice). If applicant does not seasonably traverse the well-known statement during examination, then the object of the well-known statement is taken to be admitted prior art. In re Chevenard, 139 F.2d 71, 60 USPQ 239 (CCPA 1943). A seasonable challenge constitutes a demand for evidence made as soon as practicable during prosecution. Thus, applicant is charged with rebutting the well-known statement in the next reply after the Office action in which the well known statement was made.

22. Any inquiry concerning this communication or earlier communications from the examiner should be directed to **Roy M. Punnoose** whose telephone number is **571-272-2427**. The examiner can normally be reached on 9:00 AM - 5:30 PM.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, **Tarifur Chowdhury** can be reached on **571-272-2287**. The fax phone number for the organization where this application or proceeding is assigned is **571-273-8300**.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications

may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

/Roy M. Punnoose/
Primary Patent Examiner
Art Unit 2886